

# Efficacy of Psychoneurobics on Selected Psychological Variables among Higher Secondary Boys

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#### Abstract

The random group experimental study was done to find out the Efficacy of psychoneurobics on selected psychological variables among higher secondary boys. It was hypothesized that there would be significant differences on selected psychological variables such as anxiety and Stress due to psychoneurobics among Higher Secondary boys than the control group. For the purpose of the study, 30 higher secondary boys were selected randomly from Chennai district of Tamil Nadu between the age group of 15 to 18 years and they were divided into two groups A and B having 15 subjects each. Pre-test was conducted for the two Groups (A and B) on the selected dependent variables before the start of the training program. Group A was given psychoneurobics; Group B (Control Group) didn't receive any specific treatment, but in active rest. After the experimental period of eight weeks, both Groups (A and B) were retested again on the same selected dependent variables as post-test. Analysis of covariance (ANCOVA) was used to find out the significant differences between experimental group and the control group. The results of the study proved that psychoneurobics made significant differences on selected psychological variables both Anxiety and Stress (reduced) among Higher Secondary boys. The hypothesis was accepted at 0.05 level of confidence. Hence, it is concluded that psychoneurobics are beneficial to the Higher Secondary boys to reduce anxiety and stress.

Keywords: Anxiety, stress, psychoneurobics, higher secondary boys

Anxiety happens in human being as he/she born in the world

#### Introduction

and starts from the first distress or he enjoys it. Anyhow anxiety is a common phenomenon and complex too in the breath in itself. The baby feels full of anxiety in his babyhood. We don't know whether it is a present dynamic life, It happens each and every movement or actions of an individual. So it actuates the individual to engage in his regular actions. Anxiety is a basic human emotion consisting fear and uncertainty. It occurs when the event happening in the individual's life brings to a threat to his/her ego or selfesteem. So each and every event in our life brings anxiety. In school life the boys are also feeling different types of anxiety. As school life is always measured with performance and achievements, it is a place for anxiety. The main anxiety among boys occurs at the time of examinations or any other mode of assessments. So the anxiety during examinations called the test anxiety. Test anxiety is a psychological condition in which a person experiences distress before, during or after the examination or other assessment to such an extent that this anxiety causes poor performance or inference with normal learning.

Test anxiety can be traced with some symptoms like

perspiration, rapid heartbeat, clammy hands, shortness in breath etc. It may further lead to freezing of mind and forgets the contents studied for examination. Certain persons with perfectionism and some who are not ready to accept their mistake or failures, such type of people feels very rapidly high level of test anxiety. This test anxiety effect both body and mind. When an individual feels stress his body starts to produce adrenaline, it creates physical tension, sweating, pounding heart beat and rapid breathing.

So our body and mind get tensed and feel problems. All the muscle will be feel tensed mind will be fill with negative emotions which may ultimately leads to failure in the performance in the particular assessment.

#### **Objective of the Study**

The objectives of the study were to find out whether there would be any significant difference on psychological variables such as anxiety and stress due to psychoneurobics among Higher Secondary boys.

## **Statement of the Problem**

The purpose of the study was to find out the efficacy of

psychoneurobics on selected psychological variables among higher secondary boys.

#### **Hypothesis**

It was hypothesised that there would be a significant differences on selected Psychological variables such as anxiety and stress due to psychoneurobics among Higher Secondary boys than the control group.

#### **Delimitations**

- The subjects were higher secondary boys only.
- Age of subjects was ranged from 15 to 18 years only
- The study was delimited to Chennai District of Tamil Nadu only
- Independent variable was psychoneurobics only.
- The dependent variables were restricted to psychological variables anxiety and stress only.

#### Limitations

- The Factors like Socio- Economical status were not taken into consideration.
- The climatic conditions were not considered.
- Factors like Life style habits were not taken into consideration.
- Day to day activities of the subjects were not taken into account.
- Diet and Medication followed by subjects were not controlled.

#### **Review of Related literature**

Singh, Amarendra N (2015) found that psychosomatic diseases are the pathological expression of biological, psychic, and social parameters of health and illness, whereas Yogic approaches are ways to bind closely the normal interrelationships of above. Thus, the Yoga, a mystic way of life, originated 2,800 years ago in India and compiled comprehensively by Patanjali in the fourth century is remarkably vibrant, unique and successful in the management of psychosomatic diseases. The Sanskrit term 'Yoga' means the union of individual self (jiva- atman) with transcendental self (parama-atman). Patanjali defines yoga as "restriction of wheels of consciousness and path of ecstatic selfmethodological transmutation transcendence or consciousness to the point of liberation from the spell of egopersonality". Yoga therapy emphasizes self-regulation by patients and stresses the importance of somatopsychic functioning of the individual. The spiritual itinerary of yoga is discussed and emphasis is given to its use in these psychosomatic diseases where therapeutic effectiveness can be demonstrated logically and scientifically. Besides reviewing the recent researches of yoga therapy, particular

effort is made to discuss its relationship to other therapies of psychosomatic diseases. Yogic approaches have been successfully used in the management of bronchial asthma, essential hypertension, mucous colitis, peptic ulcer, cervical spondylosis, chronic sinusitis, intractable pain, personality disorder, anxiety reaction, anxiety, depression, gastritis and rheumatism.

Telles, Shirley *et al.*, (2019) [11] found that Pre-teen children faced stressors related to their transition from childhood to adolescence, with a simultaneous increase in academic pressure. The present study compared the immediate effects of 18 min of

- i). High frequency yoga breathing with
- ii). Yoga-based breath and
- iii). Sitting quietly, on
  - a) Attention and
  - b) Anxiety

In 61 pre-teen children (aged between 11 and 12 years; 25 girls). Attention was assessed using a six letter cancellation task and Spielberg's State Trait Anxiety Inventory STAI-S was used to measure anxiety before and after the three practices, practiced on separate days. Repeated measures ANOVA, followed by Bonferroni adjusted post-hoc analyses showed an increase in total attempts and net scores after high frequency yoga breathing (p<0.05) while wrong attempts increased after yoga based breath awareness (p<0.05). Anxiety decreased comparably after all three interventions. The 25 girls in the group had the same trend of results as the whole group with respect to the attention-based cancellation task, while boys showed no, how since change. For both girls and boys, anxiety decreased after all three 18min interventions. The results suggest that high frequency yoga breathing could be a short, useful school based practice to improve attention and reduce anxiety.

## Methodology

To achieve the purpose of the study, 30 higher secondary Boys from Chennai District of Tamil Nadu state, aged between 15 and 18 and they were divided into two groups A and B with 15 subjects each. Preliminary test was taken for both the groups (A and B) before starting the training program. Group B (control group) was permitted to undergo their routine and normal life style without any specific training. After eight weeks, the both the groups were rested again on the same selected dependent variables. Analysis of co-variance (ANCOVA) was used to find out the significant differences between experimental group and the control group. The test of significance was fixed at 0.05 level of confidence.

#### **Result on Anxiety**

Table 1: Analysis of co-variance of the means of experimental group and the control group on anxiety- (Scores in Marks).

Test	Group A	Group B	Source of Variation	Degrees of Freedom	Sum of Squares	Mean Sum of Squares	F-Ratio
Pre-Test	31.40	30.07	Between	1	13.33	6.67	0.04
			within	28	6946.53	165.39	
Post-Test	18.93	26.40	Between	1	418.13	209.07	5.13*
			within	28	1712.53	40.77	
Adjusted Post-Test	18.88	26.35	Between	1	418.08	209.04	5.01*
			within	27	1712.36	41.76	

<sup>\*</sup>Significant at 0.05 level of confidence (Table F ratio at 0.05 level of confidence for df 1 and 28=4.20, 1 and 27 = 4.21).

#### **Results on Stress**

**Table 2:** Analysis of co-variance of the means of psychoneurobics group and control group on stress (scores in marks)

Test	Group A	Group B	Source of Variance	Sum of Squares	df	Mean Squares	F-Ratio	
Pre-Test	34.93	34.20	Between	4.03	1	4.03	0.41	
			within	277.33	28	9.90	0.41	
Post -Test	17.47	35.07	Between	2323.20	1	2323.20	395.04*	
			within	164.67	28	5.88		
Adjusted	17.36	35.17	Between	2345.46	1	2345.46	447.75*	
			within	141.44	27	5.24	447.73	
Mean gain	17.47	0.87						

<sup>\*</sup>Significant at 0.05 level of confidence. (Table F ratio at 0.05 level of confidence for 1 and 28 (df)=4.2, 1 and 27(df) =4.21.

The obtained F value on pre-test scores 0.41 was lesser than the required F value of 4 to be significant at 0.05 level. This proved that there was a significant difference between groups a pre-test and post-test and the randomization at the pre-test was equal. The post-test sco-analysis proved that there was significant difference between the groups, as obtained F val 395.04 was greater than the required F value of 4.20. This proved that the differences between the post-test means of the subjects were significant. Taking into consideration the pre and post-test cores among the groups, adjusted mean scores were calculated and subjected to statistical treatment. The obtained F value 447.75 was greater than the required F value of 4.20. This proved that there was a significant difference on Stress reduced due to 12 weeks of psychoneurobics among Higher Secondary boys.

#### **Results and Discussions**

It was hypothesized that there would be significant differences on selected Psychological variables such as anxiety and Stress due to psychoneurobics among Higher Secondary boys than the control group. The results proved that there were significant differences on anxiety (reduced) and Stress (reduced) than the control group among Higher Secondary boys due to psychoneurobics.

#### Conclusion

It is concluded that psychoneurobics (Group I) significantly reduced both anxiety and stress among Higher Secondary boys. Hence psychoneurobics are beneficial for Higher Secondary boys for test anxiety.

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